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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/998,724	11/30/2001	Rolf Bruck	E-41365	7179

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EXAMINER

DUONG, THANH P

ART UNIT PAPER NUMBER

1764

DATE MAILED: 07/13/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/998,724

Applicant(s)

BRUCK, ROLF

Examiner

Tom P. Duong

Art Unit

1764

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 19 April 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-11 and 13-28 is/are pending in the application.
- 4a) Of the above claim(s) 1-4 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 5-11 and 13-28 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

### **DETAILED ACTION**

Applicant's remarks and amendments filed on April 19, 2005 have been carefully considered. Claims 1-2, 5-6,8, and 11 have been amended. Claim 12 has been canceled. New claims 17-28 have been added. Claims 1-11 and 13-28 are pending in this application.

#### ***Claim Rejections - 35 USC § 112***

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

1. Claims 11, 13, 16, and 25-28 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Claim 11 is indefinite and inaccurate since it is not clear what it means by the phrase "a plastically deformable and subsequently consolidated first mass".

#### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 5, 8, 14-15, and 17-24 are rejected under 35 U.S.C. 102(b) as being anticipated by Yoshida et al. (4,535,589). Yoshida discloses a honeycomb body [(42), and Col. 3, lines 49-52)], comprising: ceramic walls (Col. 3, lines 49-52) formed of printed layers (Col. 4, lines 65-68 and Col. 5, lines 1-2) forming channels through which a fluid can flow (Col. 3, lines 13-17), said channels lying next to one another; and at least one of at least one measuring sensor 5 (Fig. 1) and electrically conductive mass (43j,43K) made of heat resistant material such as platinum and etc (Col. 4, lines 58-64) integrated into one of said ceramic walls (Fig. 4) and ceramic body made of lanthanum chromite (Col. 3, lines 60-66).

3. Claims 11, 16, and 25-28 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Yoshida et al. (4,535,589). Yoshida discloses a honeycomb body [(42), and Col. 3, lines 49-52)], comprising: ceramic walls (Col. 3, lines 49-52) formed of printed layers (Col. 4, lines 65-68 and Col. 5, lines 1-2) forming channels through which a fluid can flow (Col. 3, lines 13-17), said channels lying next to one another; and at least one of at least one measuring sensor 5 (Fig. 1) and electrically conductive mass (43j,43K) made of heat resistant material such as platinum and etc (Col. 4, lines 58-64) integrated into one of said ceramic walls (Fig. 4) and ceramic body made of lanthanum chromite (Col. 3, lines 60-66). With respect to the recitation of "a plastically deformable and subsequently consolidated "first mass, it is best understood by Examiner that such recitation is the property of the honeycomb. However, Yoshida discloses the honeycomb body is made of the same material as the

claimed invention; thus, one of ordinary skill in the art would have expected the honeycomb of Yoshida inherently has the same property as the claimed invention or the honeycomb of the claimed invention is obvious over the honeycomb of Yoshida. See *In re Best*, 562 F.2d 1252, 1255, 195 USPQ 430, 433 (CCPA 1977).

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 6 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Yoshida '589 in view of Maus et al. '746. Yoshida discloses the electrically conductive mass (43k) is surrounded completely by ceramic as shown in Fig. 4 but fails to disclose the sensor is completely surrounded by ceramic. Maus teaches the temperature sensor is embedded in the layer of electrically insulated ceramic material (Col. 2, lines 18-42) in order to protect the sensor from corrosion (Col. 1, lines 45-61) and accurately measure the wall temperature of catalytic converter (Col. 3, lines 50-60). Thus, it would have been obvious in view of Maus '746 to one having ordinary skill in the art to modify the honeycomb body of Yoshida with sensor surrounded by ceramic as taught by Maus '746 in order to protect the sensor from corrosion and allow precise temperature measurement of the wall temperature of the catalytic converter.

5. Claim 9 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Yoshida '589 in view of Maus et al. '208. Regarding claim 10, Yoshida discloses the claimed invention except the structure is one of wavy and zigzag-shaped. Maus '208 teaches it is desirable to fabricate the honeycomb body with zig-zag corrugation (Figs 1 and 2 and Col. 3, lines 32-36) to increase the catalytic conversion rate (Col. 2, lines 54-59). Thus, it would have been obvious in view of Maus '208 to one having ordinary skill in the art to modify the honeycomb structure of Yoshida '589 with a zigzag-shaped as taught by Maus '208 in order to provide a catalyst structure with improved catalytic conversion rate.

6. Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Yoshida '589 in view of Maus et al. '208. Yoshida discloses the claimed invention except an orifice formed from one channel to another channels. Maus '208 teaches the channels are formed with inverted regions 4,5 (Fig. 1) which have orifice to facilitate intermixing of the fluid (Col. 4, lines 32-39), which increases the efficiency of the catalytic converter (Col. 2, lines 47-59).

### ***Response to Arguments***

Applicant's arguments with respect to claims 1-11, and 13-28 have been considered but are moot in view of the new ground(s) of rejection. The amended claims

5, 8, 11, and newly added claims 17-28 added the feature of "printed layer(s)" necessitates new ground of rejection.

### ***Conclusion***


Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).


A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tom P. Duong whose telephone number is (571) 272-2794. The examiner can normally be reached on 8:00AM - 4:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Glenn Caldarola can be reached on (571) 272-1444. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Tom Duong  
July 5, 2005  
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